Determinants of Sustainable Solid Waste Management Behavioural Intention in Oman: An Integrated PLS-SEM Approach

Motasem Y.D. Alazaiza[1, *], Tahra Al Maskari [1, *], Mohammed J.K. Bashir [2], Obie Farobie [3] and Ahmed Albahnasavi [4], Dia Eddin Nassani[5]

Supplementary Materials

Table S1. The major constructs and its related indicators

Construct	Indicator	Question
Environmental Knowledge (EK)	**Operational definition**	**Respondents' perceived understanding of environmental impacts and sustainable waste-management practices**
	EK1	I have sufficient knowledge about major environmental problems affecting society.
	EK2	I understand the environmental consequences of improper waste disposal and pollution.
	EK3	I know how individual activities can contribute to environmental degradation.
	EK4	I am familiar with practices that can reduce negative impacts on the environment.
	EK5	I understand the importance of conserving natural resources such as water and energy.
	EK6	I am knowledgeable about ways to protect and preserve the natural environment.
Environmental Attitude (EA)	**Operational definition**	**Respondents' favourable or unfavourable evaluation of sustainable waste-management practices**
	EA1	Protecting the environment is important to me.
	EA2	I believe that environmental protection should be a priority for society.
	EA3	I feel personally concerned about environmental problems.
	EA4	I believe that individuals have a responsibility to protect the environment.
	EA5	I have a positive attitude toward environmentally responsible practices.
	EA6	I believe that protecting the environment benefits both current and future generations.
Perceived Benefits (PB)	**Operational definition**	**Respondents' perceptions of the environmental and practical advantages of sustainable waste management**
	PB1	I believe that adopting environmentally friendly practices provides important benefits.

Construct	Indicator	Question
	PB2	Environmentally responsible practices can help conserve natural resources.
	PB3	Environmentally friendly practices can improve environmental quality.
	PB4	Adopting environmentally friendly practices can benefit my community.
	PB5	Environmentally responsible behaviour can contribute to a better quality of life.
	Operational definition	**Perceived expectations and encouragement from family, friends, peers and the wider community**
Social Influence (SI)	SI1	People who are important to me encourage me to behave in an environmentally responsible way.
	SI2	My family encourages me to adopt environmentally friendly practices.
	SI3	My friends and colleagues influence me to engage in environmentally responsible behaviour.
	SI4	People around me expect me to act in an environmentally responsible manner.
	SI5	I am more likely to adopt environmentally friendly practices when people around me do so.
	Operational definition	**Perceived availability of institutional encouragement, supporting services and resources for sustainable waste management**
Institutional Support (IS)	IS1	Government institutions provide sufficient support for environmentally responsible practices.
	IS2	Environmental regulations encourage people to behave in environmentally responsible ways.
	IS3	Government institutions provide adequate information about environmental protection.
	IS4	Environmental initiatives and programmes make it easier for people to adopt environmentally friendly practices.
	IS5	Educational institutions provide adequate environmental awareness and education.
	IS6	Local institutions provide sufficient facilities and services to support environmentally responsible behaviour.
	Operational definition	**Respondents' stated willingness to engage in sustainable waste-management activities**
Behavioural Intention (BI)	BI1	I intend to engage in environmentally responsible practices in the future.
	BI2	I plan to adopt more environmentally friendly practices whenever possible.

Construct	Indicator	Question
	BI3	I intend to reduce my negative impact on the environment.
	BI4	I will make an effort to participate in activities that protect the environment.
	BI5	I intend to continue practicing environmentally responsible behaviour.